

February 24, 2015

Natel Energy Comments to EPIC Workshop Feb 24, 2015 on Checking in on the Implementation of the First-Triennial Investment Plan

Please see the below recap of our comments presented at the workshop. Thank you for creating the forum for this feedback.

From the CEC's own publications¹ the California small hydro potential for in-conduit, constructed waterways – read no environmental impact – is 250 MW. Many of these projects, for example, would be in 500 kW to 5 MW irrigation drop projects. From the same CEC study, there is another 2 GW of potential at impoundments and natural waterways for a total 2.2 GW total potential. And note, this could provide the equivalent energy to 5 GW or 7 GW of wind or solar because of the high hydro capacity factors. Also, importantly, this is <u>base load</u> energy without the integration issues of other renewables that are intermittent and unpredictable.

There are multiple, promising California grown technologies including Natel Energy's that can make this small distributed hydro very cost effective. There are two areas of EPIC funding that would dramatically accelerate realization of this resource: R&D and demonstration funding and project assistance.

We are unaware of EPIC PONs to date that apply to distributed small hydro. Projects would be in the 200 kW to 2000+ kW size range. We would like to see one or more funding opportunities for small distributed hydro technologies and projects.

The benefits to CA ratepayers are numerous. Hydro is a large, baseload renewable energy and as California seeks to build toward ever more ambitious RPS standards, baseload energy is crucial. Also, hydro will be key for the growing emphasis on the water-energy nexus component, for example, by helping support the struggling CA irrigation and water delivery sectors with revenues from their operations. External to California, but able to increase the California tax base is the huge export potential to inevitable, massive worldwide hydro development efforts and reducing the potential massive environmental and social impacts through more responsible technologies.

Thank you for your consideration,

Eric Thompson VP Sales & Marketing

http://www.energy.ca.gov/2005publications/CEC-500-2005-074/CEC-500-2005-074.PDF